Puget Sound Naval Shipyard — Including Jackson Park Housing Complex — NPL

Size: 152 acres

Mission: Provide logistical support for assigned ships and service craft; perform authorized work in connection with construction, overhaul, and other tasks

HRS Score: 50.00 (Puget Sound Naval Shipyard); placed on NPL in May 1994
50.00 (Jackson Park Housing Complex); placed on NPL in May 1994

IAG Status: None

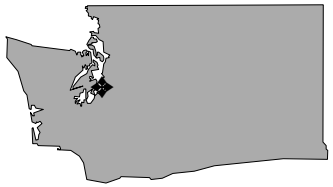
Contaminants: Heavy metals, VOCs, petroleum/oil/lubricants, grit, paint, solvents, construction debris, acids, and silver nitrate

Media Affected: Groundwater, surface water, sediment, and soil

Funding to Date: $60.5 million

Estimated Cost to Completion (Completion Year): $51.1 million (FY2006)

Final Remedy in Place or Response Complete Date for All Sites: FY2001



Bremerton and Kitsap Counties, Washington

Restoration Background

Most of the Bremerton Naval Complex (BNC), which includes the Puget Sound Naval Shipyard (PSNS), is built on contaminated fill material. Metals and petroleum/oil/lubricants are the primary contaminants. The main sources of contamination are past operations, such as cleaning and demilitarization of ordnance, and ship construction, maintenance, and demolition.

In FY83, an Initial Assessment Study (IAS) identified six potentially contaminated sites at BNC. In FY90, a supplemental Preliminary Assessment identified five other potentially contaminated sites. Nine of these 11 sites were recommended for further investigation. A draft IAS, completed in FY83 for the Jackson Park Housing Complex (JPHC), identified eight sites. Two sites were recommended for further investigation, and six for no further action. A Site Inspection report prepared in FY88 recommended further investigation of the two sites first identified in the IAS and divided one site into two parts.

In FY92, an underground storage tank (UST) validation report identified 26 abandoned tanks that required further investigation. Nine of those tanks were removed. In FY94, the remaining 17 tanks were removed or closed. Subsequent negotiations with the state regulatory agency revealed a need for further action for five tanks. In FY94, the installation excavated contaminated soil from a site at BNC and disposed of the soil at an approved off-site facility. Three Removal Actions were conducted at JPHC.

In FY95, sampling and analysis of soil and groundwater were conducted at three sites in the JPHC, and a Remedial Investigation (RI) was completed. Soil sampling and analysis were conducted at three other sites in the housing complex. Also in FY95, an extensive demonstration of steam-sparging was conducted at BNC to address oil contamination in the subsurface environment. The installation entered into a Memorandum of Understanding with the U.S. Geological Survey to obtain technical support.

In FY96, a Human Health Risk Assessment was completed for the terrestrial sites at JPHC, and development of Remedial Action (RA) work plans and decision documents was initiated for an operable unit (OU) at BNC. A corrective action began for five USTs. RI and Feasibility Study (FS) activities were performed at six sites at PSNS and three sites at JPHC. In FY97, the installation completed the demonstration of steam-sparging and awarded a contract for designing and constructing a full-scale system. The installation used geoprobe to assist with the benzene seep investigation at JPHC. A Site Characterization and Analysis Penetrometer System (SCAPS) delineated the extent of petroleum contamination at BNC OU C.

JPHC and BNC formed their technical review committees (TRCs) in FY91 and FY92, respectively. Both TRCs were converted to Restoration Advisory Boards in FY94.

FY98 Restoration Progress

At JPHC, a final round of marine data for OU2 was collected in partnership with the state. The benzene investigation was completed, and final actions will be addressed as part of OU1. The FS addressing human health risks and the RI/FS addressing ecological marine risks were finalized. An unexploded ordnance (UXO) sweep and investigation began at Sites 101 and 103, resulting in the discovery of expended munitions and one item with a small amount of smokeless powder. Regulators and stakeholders reviewed a draft Proposed Plan (PP).

At BNC, Remedial Designs (RDs) for OUs NSC and A were completed. The RA for OU NSC was not completed on schedule because of the extent of the work required and the necessary coordination with ongoing mission activities. The RA for OU A was delayed by extensive negotiations with a local tribe about the action's potential impacts on the marine environment. The RI for OU B was not completed as scheduled because state and federal regulatory agency reviews took longer than expected. The steam-sparging expansion was completed and is operational. An Engineering Evaluation and Cost Analysis (EE/CA) and an Action Memorandum were prepared for capping potential contaminant sources within OU B. A Removal Action for capping Site 1 was completed.

Plan of Action

- At JPHC complete UXO investigation and sign Record of Decision (ROD) for four sites in FY99
- At JPHC, in FY99, conduct a Time-Critical Removal Action to temporarily prevent erosion of contaminated soil into the bay
- At BNC, complete RI/FS for OU B, and RA at OU A and OU NSC in FY99
- At BNC, complete the PP and the ROD and begin RD and the marine portion of RA for OU B in FY00
- At JPHC, complete RD and begin RA for four sites in FY00 and complete RA in FY05

FY99 Funding by Phase and Relative Risk